

Case 3343

***Gigantopecten* Rovereto, 1899 and *Lissochlamys* Sacco, 1897
(Mollusca, Bivalvia, PECTINIDAE): proposed conservation**

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Abstract. The purpose of this application, under Article 23.9.3 of the Code, is to conserve the names *Gigantopecten* Rovereto, 1899 and *Lissochlamys* Sacco, 1897 for two genera of Neogene scallops (PECTINIDAE) by suppression of their senior objective synonyms, *Macrochlamys* Sacco, 1897 and *Lissochlamis* Sacco, 1897 respectively. *Gigantopecten* is a replacement name for *Macrochlamys* Sacco, 1897 which is a junior homonym of the gastropod name *Macrochlamys* Benson, 1832.

Keywords. Nomenclature; taxonomy; Mollusca; Bivalvia; PECTINIDAE; *Macrochlamys*; *Macrochlamis*; *Lissochlamys*; *Lissochlamis*; *Gigantopecten*; *Gigantopecten latissimus*; *Lissochlamys excisa*; Cenozoic; Neogene; Europe.

1. The names *Macrochlamis* Sacco, 1897a (11 June) (p. 101) and *Lissochlamis* Sacco, 1897a (p. 102) were first introduced for two subgenera of scallops (family PECTINIDAE). In this work Sacco listed the taxa that he expected to include in a forthcoming part of his extensive series of monographs under the same title and therefore did not include descriptions, illustrations, or bibliographic references. The type species of *Macrochlamis* was given as *Ostrea latissima* Brocchi, 1814 (p. 101) and that for *Lissochlamis* as *Pecten excisus* Bronn, 1831 (p. 102). Because a type species and included species were listed for each name, these names are available under Article 12.2.5 of the Code.

2. The spellings of *Macrochlamis* and *Lissochlamis* were changed to *Macrochlamys* and *Lissochlamys* Sacco (1897b (30 December), pp. 32, 46) in a monograph with the same title and part numbers as published in the preceding *Bollettino* article (Sacco, 1897a). Although the monograph contains taxonomic descriptions, illustrations, and bibliographic references, there was no mention of the spellings 'Macrochlamis' and 'Lissochlamis' that appeared in the *Bollettino*, nor was reference to the *Bollettino* article provided. However, the monograph clearly introduced some substantial changes. Several varietal names were introduced that did not appear in the 1897a listing, and the subgeneric name *Chlamys* (*Felipes*) Locard in Carus, 1889, that appeared in Sacco (1897a, p. 101), was replaced by *Chlamys* (*Manupecten*) Monterosato, 1889 in Sacco (1897b, p. 36). Sacco (1897c (31 December), pp. 15-19)

published a note in which he again used the subgeneric names *Chlamys* (*Macrochlamys*) and *Chlamys* (*Lissochlamys*) spelled with a 'y'.

3. Rovereto (1899, p. 90) recognized that the name *Macrochlamys* Sacco, then in use, is a junior homonym of *Macrochlamys* Benson, 1832 (Gastropoda) and introduced the replacement name *Gigantopecten* for Sacco's subgenus. Later, Sacco (1904, p. 143) ratified Rovereto's (1899) action by recognizing the name *Gigantopecten*. Ugolini (1906, p. 187) was apparently the first palaeontologist, other than Sacco, to accept Rovereto's (1899) action. In defining the subgenus *Gigantopecten* Ugolini expanded the diagnosis of the subgenus *Macrochlamys* given by Sacco (1897b).

4. Hertlein (1969, p. N358), in the *Treatise on Invertebrate Paleontology*, followed by Vokes (1980, p. 229), used the subgeneric name *Chlamys* (*Macrochlamis*) Sacco, 1897a, including *Macrochlamys* Sacco, 1897b and *Gigantopecten* Rovereto, 1899 in its synonymy without discussion. Nevertheless, these actions provided for a continuing division among palaeontologists as to whether this taxon should be named *Gigantopecten* or *Macrochlamis*. Both authors also regarded *Lissochlamis* as the correct original spelling and *Lissochlamys* as a junior objective synonym.

5. Since 1969, only a few authors have discussed (rather than merely listed) the alternative names for these European genera. Malatesta (1974, p. 52) wrote forcefully in favour of the name *Gigantopecten* emphasizing that the name *Macrochlamis* could not be typographically correct because *Macrochlamys* is a composite word using the pre-existing word *Chlamys*. He concluded that to stabilize the name on the basis of priority rather than a spelling error seemed contrary to logic. Freneix et al. (1987, p. 32) agreed with Malatesta (1974) and raised *Gigantopecten* to generic rank, advocating that *Lissochlamis* should also be automatically emended to *Lissochlamys*. However, Smith (1991, p. 72) argued in favour of the original spelling *Macrochlamis* over *Macrochlamys* on the basis of priority. Marshall (1991, p. 111) reviewed the dates of Sacco's publications and regarded the use of 'chlamis' in the names *Macrochlamis* and *Lissochlamis* to have been an incorrect transliteration of the Greek word 'chlamys' rather than an orthographic error. Because incorrect transliterations are not subject to automatic emendation (see Article 32.5.1) Marshall concluded that *Macrochlamys* and *Lissochlamys* were unjustified emendations. Most European palaeontologists, however, have not accepted this interpretation. In a sample of publications of the past 20 years, we counted 12 that used the name *Macrochlamis* (Studencka & Studencki, 1988; Marshall, 1991; Smith, 1991; Nevesskaya et al., 1993; Pedley & Grasso, 1994; Vera-Pelaez et al., 1995; Dulai, 1996; Roetzel et al., 1999; Mandic & Piller, 2001; Górká, 2002; Harzhauser et al., 2003; Mandic, 2004), eight that used *Macrochlamys* (Atanackovic, 1985; Andr s Galache & de Porta Vernet, 1987; Caretto, 1987;  tyrok y, 1987; Dermitzakis & Georgiades-Dikeoulia, 1987; Blondel & Demarcq, 1990; Mikuř, 1998; Schultz, 1998), and 48 that used the name *Gigantopecten* (Barrier et al., 1987; Bongrain, 1987, 1988a, 1988b, 1992, 1993, 1995, 2003; Ben Moussa et al., 1987, 1988, 1989;  tyrok y, 1987; Dermitzakis & Georgiades-Dikeoulia, 1987; Freneix et al., 1987; Moissette, 1988; Cavelier, 1989; Philippe & Savay-Guerraz, 1989; Blondel & Demarcq, 1990; Demarcq, 1990a, 1990b, 1992; Demarcq & Schoepfer, 1990; Ben Moussa & Demarcq, 1992; Leone et al., 1992; Folliot et al., 1993; Ben Moussa, 1994; Civis et al., 1994; Pfister & Wegm ller, 1994; Studencka, 1994; Aguirre et al., 1996; Duranthon & Cahuzac, 1997; Cahuzac &

Cluzaud, 1998; Cardenas, 1998; Chira, 1998; Ginsburg et al., 1998; Mikuž, 1998, 2002; Studencka et al., 1998; Cahuzac & Tassy, 1999; Cahuzac & Turpin, 1999; Chaix et al., 1999; Monegatti & Raffi, 2001; Schultz, 2001; Lacour et al., 2002; Aguirre & Yesares Garcia, 2003; Courville & Bongrain, 2003; Santos et al., 2003; Martín et al., 2004). Although we shall not list the additional references, our search of the literature from 1897 to present thus far has found usages as follows: *Macrochlamis* (20), *Macrochlamys* (36) and *Gigantopecten* (73). Clearly, stability of nomenclature has been compromised.

6. In order to conserve the current usage of the name *Gigantopecten* Rovereto, 1899, for a common European Neogene pectinid bivalve, we propose under Article 23.9.3 the suppression of the name *Macrochlamis* Sacco, 1897a. Because *Macrochlamys* Sacco is a junior homonym of *Macrochlamys* Benson, 1832, the replacement name *Gigantopecten* Rovereto, 1899 will be conserved. Because it is an exactly analogous case, we also propose under Article 23.9.3 suppressing the name *Lissochlamis* in order to conserve the name *Lissochlamys*. Our records indicate that in the past 20 years, *Lissochlamis* has been used eight times (Schein-Fatton, 1988; Schein, 1989; Carter, 1990; Marshall, 1991; González Delgado et al., 1999; Schultz, 2001; Dijkstra & Goud, 2002; Schein, 2006) and *Lissochlamys* has been used seven times (Andrès, 1986; Andrès Galache & de Porta Vernet, 1987; Freneix et al., 1987; González Delgado, 1987; Castano et al., 1988; Da Rocha et al., 1989; Lozano Francisco, 1998). Since 1897, however, *Lissochlamys* has been used much more frequently (34 records in our database for *Lissochlamys* but only 13 for *Lissochlamis*).

7. The International Commission on Zoological Nomenclature is accordingly asked:

- (1) to use its plenary power to suppress the following names for the purposes of the Principle of Priority but not for those of the Principle of Homonymy:
 - (a) *Macrochlamis* Sacco, 1897;
 - (b) *Lissochlamis* Sacco, 1897;
- (2) to place on the Official List of Generic Names in Zoology the following names:
 - (a) *Gigantopecten* Rovereto, 1899 (gender: masculine), type species *Ostrea latissima* Brocchi, 1814 by original designation for the replaced generic name *Macrochlamys* Sacco, 1897;
 - (b) *Lissochlamys* Sacco, 1897 (gender: feminine), type species by original designation *Pecten excisus* Bronn, 1831;
- (3) to place on the Official List of Specific Names in Zoology the following names:
 - (a) *latissima* Brocchi, 1814, as published in the binomen *Ostrea latissima* (specific name of the type species of *Gigantopecten* Rovereto, 1899, the replacement name of *Macrochlamys* Sacco, 1897);
 - (b) *excisus* Bronn, 1831, as published in the binomen *Pecten excisus* (specific name of the type species of *Lissochlamys* Sacco, 1897);
- (4) to place on the Official Index of Rejected and Invalid Generic Names in Zoology the following names:
 - (a) *Macrochlamis* Sacco, 1897 (as suppressed in (1)(a) above);
 - (b) *Lissochlamis* Sacco, 1897 (as suppressed in (1)(b) above);
 - (c) *Macrochlamys* Sacco, 1897 (a junior homonym of *Macrochlamys* Benson, 1832).

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